

**510(k) Summary**

Proprietary Name: AxSOS 3 Ti Locking Plate System

**JUN 20 2014**

Common Name: Bone Plates  
Bone Screws

Classification Name and Reference: Single/multiple component metallic bone fixation appliance and accessories 21 CFR §888.3030

Smooth or threaded metallic bone fixation fastener  
21 CFR §888.3040

Regulatory Class: Class II

Product Codes: HRS: Plate, Fixation, Bone  
HWC: Screw, Fixation, Bone

Sponsor: Stryker Trauma AG

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Date Prepared: April 29, 2014

***Description***

This Traditional 510(k) submission is being supplied to the U.S. FDA to obtain authorization to market additional plates and screws within the AxSOS 3 Ti Locking Plate System. The AxSOS 3 Ti Locking Plate System includes anatomically contoured monoaxial locking plates. The 5.0mm System consists of the Distal Lateral Femur Plate (K123964). The 4.0mm System comprises the Proximal Lateral Tibia Plate (K123964) as well as the subject devices being the Distal Anterolateral Tibia Plate, the Distal Medial Tibia Plate and the Proximal Medial Tibia Plate. The system includes four (4) types of screws available in various diameter and thread length: locking, cortical, cancellous (K123964 & K133440) as well as the subject periprosthetic screws. The plates have been designed with holes that can accommodate either a locking or non-locking screw both at the peri-articular end and along the shaft of the plate. The plates also have an

oblong hole located at the metaphyseal junction used to aid in positioning. The subject components will be available sterile and non-sterile.

***Intended Use***

The AxSOS 3 Ti Locking Plate System is intended for long bone fracture fixation.

***Indications for Use***

The AxSOS 3 Ti Locking Plate System is intended for long bone fracture fixation.

Indications include:

- Diaphyseal, metaphyseal, epiphyseal, extra- and intra-articular fractures
- Non-unions and malunions
- Normal and osteopenic bone
- Osteotomies
- Periprosthetic fractures of the femur and proximal tibia

***Summary of Technology***

The device comparison showed that the subject device is substantially equivalent in intended use, design, materials and operational principles to the following predicate devices:

- Synthes LCP Distal Tibia Plates (K013248)
- Synthes (USA) 3.5/4.5MM LCP Medial Proximal Tibia Plates (K050646)
- Peri-Loc Bone Plating and Screw System (K083032)
- Synthes Peri-Prosthetic Screws (K041533)

The subject plates and screws are substantially equivalent to the predicate devices in regards to intended use, design, materials, and operational principles for use for long bone fracture fixation.

***Non-Clinical Test***

Non-clinical laboratory testing was performed on the worst case subject plates to determine substantial equivalence. The following testing was performed:

- “*Standard Specification and Test Method for Metallic Bone Plates*” as per ASTM F382-99 (reapproved 2008)
- “*Standard Specification and Test Methods for Metallic Medical Bone Screws* as per ASTM F 543-07”

Testing demonstrated that the subject plates are substantially equivalent to the currently marketed predicate devices.

***Clinical Testing***

Clinical testing was not required for this submission.

***Conclusion***

The subject AxSOS 3 Ti Locking Plate System is substantially equivalent to the predicate devices identified throughout this submission.



DEPARTMENT OF HEALTH & HUMAN SERVICES

Public Health Service

Food and Drug Administration  
10903 New Hampshire Avenue  
Document Control Center - WC066-G609  
Silver Spring, MD 20993-0002

Stryker Trauma AG  
Mr. Elijah Wreh  
Regulatory Affair Specialist  
325 Corporate Drive  
Mahwah, New Jersey 07430

June 20, 2014

Re: K141121

Trade/Device Name: AxSOS 3 Ti Locking Plate System

Regulation Number: 21 CFR 888.3030

Regulation Name: Single/multiple component metallic bone fixation appliances and accessories

Regulatory Class: Class II

Product Code: HRS, HWC

Dated: April 29, 2014

Received: May 01, 2014

Dear Mr. Wreh:

We have reviewed your Section 510(k) premarket notification of intent to market the device referenced above and have determined the device is substantially equivalent (for the indications for use stated in the enclosure) to legally marketed predicate devices marketed in interstate commerce prior to May 28, 1976, the enactment date of the Medical Device Amendments, or to devices that have been reclassified in accordance with the provisions of the Federal Food, Drug, and Cosmetic Act (Act) that do not require approval of a premarket approval application (PMA). You may, therefore, market the device, subject to the general controls provisions of the Act. The general controls provisions of the Act include requirements for annual registration, listing of devices, good manufacturing practice, labeling, and prohibitions against misbranding and adulteration. Please note: CDRH does not evaluate information related to contract liability warranties. We remind you; however, that device labeling must be truthful and not misleading.

If your device is classified (see above) into either class II (Special Controls) or class III (PMA), it may be subject to additional controls. Existing major regulations affecting your device can be found in the Code of Federal Regulations, Title 21, Parts 800 to 898. In addition, FDA may publish further announcements concerning your device in the Federal Register.

Please be advised that FDA's issuance of a substantial equivalence determination does not mean that FDA has made a determination that your device complies with other requirements of the Act or any Federal statutes and regulations administered by other Federal agencies. You must comply with all the Act's requirements, including, but not limited to: registration and listing (21 CFR Part 807); labeling (21 CFR Part 801); medical device reporting (reporting of medical

device-related adverse events) (21 CFR 803); good manufacturing practice requirements as set forth in the quality systems (QS) regulation (21 CFR Part 820); and if applicable, the electronic product radiation control provisions (Sections 531-542 of the Act); 21 CFR 1000-1050.

If you desire specific advice for your device on our labeling regulation (21 CFR Part 801), please contact the Division of Industry and Consumer Education at its toll-free number (800) 638-2041 or (301) 796-7100 or at its Internet address

<http://www.fda.gov/MedicalDevices/ResourcesforYou/Industry/default.htm>. Also, please note the regulation entitled, "Misbranding by reference to premarket notification" (21 CFR Part 807.97). For questions regarding the reporting of adverse events under the MDR regulation (21 CFR Part 803), please go to

<http://www.fda.gov/MedicalDevices/Safety/ReportaProblem/default.htm> for the CDRH's Office of Surveillance and Biometrics/Division of Postmarket Surveillance.

You may obtain other general information on your responsibilities under the Act from the Division of Industry and Consumer Education at its toll-free number (800) 638-2041 or (301) 796-7100 or at its Internet address

<http://www.fda.gov/MedicalDevices/ResourcesforYou/Industry/default.htm>.

Sincerely yours,

**Mark N. Melkerson -A**

Mark N. Melkerson  
Director  
Division of Orthopedic Devices  
Office of Device Evaluation  
Center for Devices and  
Radiological Health

Enclosure

DEPARTMENT OF HEALTH AND HUMAN SERVICES  
Food and Drug Administration

Form Approved: OMB No. 0910-0120  
Expiration Date: January 31, 2017  
See PRA Statement below.

### Indications for Use

510(k) Number (if known)

K141121

Device Name

AxSOS 3 Ti Locking Plate System

Indications for Use (Describe)

The AxSOS 3 Ti Locking Plate System is intended for long bone fracture fixation.

Indications include:

- Diaphyseal, metaphyseal, epiphyseal, extra- and intra-articular fractures
- Non-unions and malunions
- Normal and osteopenic bone
- Osteotomies
- Periprosthetic fractures of the femur and proximal tibia

Type of Use (Select one or both, as applicable)

☒ Prescription Use (Part 21 CFR 801 Subpart D)

☐ Over-The-Counter Use (21 CFR 801 Subpart C)

PLEASE DO NOT WRITE BELOW THIS LINE -- CONTINUE ON A SEPARATE PAGE IF NEEDED.

### FOR FDA USE ONLY

Concurrence of Center for Devices and Radiological Health (CDRH) (Signature)

Elizabeth D. Frank -S

Division of Orthopedic Devices

This section applies only to requirements of the Paperwork Reduction Act of 1995.

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